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Claim Amendments.

1. (currently amended) A compound of formula I:

$$R^{1}$$
 R^{5} R^{6} R^{7} R^{c} R^{d} R^{a} R^{b} R^{b} R^{b}

or a pharmaceutically acceptable derivative thereof, wherein:

Y is N or $C(R^4)$;

R¹ is H, alkyl, -N(R)₂, -(CH₂)₁₋₆N(R°)₂, -(CH₂)₁₋₆OR°, -NRC(O)R, -C(O)N(R)₂, -CN, -NRSO₂R, -COOR, -OR, -SR, -C(O)R, halo, -OC(O)R, -NRC(O)OR, -OC(O)N(R)₂, -NRC(O)NR, -NRC(S)NR, -NRSO₂NR, -C(O)NRN(R)₂, heteroaryl, or heterocyclyl; each R², R³ and R⁴ is independently H, alkyl, fluoroalkyl, -C(O)R, -COOR, -C(O)N(R)₂, -CN, -NRC(O)R, -OR, -SR, -N(R)₂, -(CH₂)₁₋₆OR°, -(CH₂)₁₋₆N(R°)₂, or halo; each R⁵ and R⁶ is independently H, alkyl, or fluoroalkyl;

 R^7 is H, alkyl, <u>or</u> fluoroalkyl, aralkyl, carbocyclylalkyl, heterocyclyl, carbocyclyl, heterocyclylalkyl, aryl, heteroaryl, heteroaralkyl, -C(O)R, $-(CH_2)_{1-6}OR$, $-(CH_2)_{1-6}N(R)_2$, $-C(O)CH_2C(O)R$, $-N(R)_2$, $-C(O)N(R)_2$, or -C(H)(OR)R;

R⁸ is H, alkyl, or fluoroalkyl, carbocyclyl, carbocyclylalkyl, heteroaryl, heterocyclyl, CO₂R, or CON(R)₂;

 R^9 is $-OR^{10}$ or $-NR^{11}R^{12}$;

 R^{10} is R° , -C(O)R, $-C(O)N(R)_2$, -C(O)OR, $-(CH_2)_{1-6}$ --C(O)R, $-PO_3M_x$,

-P(O)(alkyl)OM', or -(PO₃)₂M_y, earbocyclyl, aryl, heterocyclyl, heteroaryl, carbocyclylalkyl, aralkyl, heterocyclylalkyl, heteroaralkyl, or a tumor targeting moiety;

x is 1 or 2;

y is 1, 2 or 3;

each M is independently H, Li, Na, K, Mg, Ca, Mn, Co, Ni, Zn, or alkyl;

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           M' is H, Li, Na, K, or alkyl;
           R<sup>11</sup> is H or alkyl:
           R^{12} is H, alkyl, -C(O)R, -C(O)N(R)_2, -C(O)OR, -SO_2R, or -SO_2N(R)_2,
earbocyclyl, aryl, heterocyclyl, heteroaryl, carbocyclylalkyl, aralkyl, heterocyclylalkyl,
heteroaralkyl or a tumor targeting moiety;
           each R<sup>a</sup> and R<sup>b</sup> is independently H, OR<sup>o</sup>, alkyl, or fluoroalkyl -OH;
           each R<sup>c</sup> and R<sup>d</sup> is independently H, alkyl, or fluoroalkyl;
           n is 0-4;
           X is a monovalent or divalent anion, or a counterion to the thiazolium nitrogen
located anywhere in the molecule;
           R° is H or alkyl; and
           R is R°, carbocyclyl, aryl, heterocyclyl, heteroaryl, carbocyclylalkyl, aralkyl,
heterocyclylalkyl, or heteroaralkyl;
           provided that the following compounds are excluded:
                      Y is C(R^4);
                      R<sup>5</sup>, R<sup>6</sup>, R<sup>a</sup>, R<sup>b</sup>, R<sup>c</sup> and R<sup>d</sup> are H;
                      R<sup>8</sup> is methyl:
                      R^9 is -OR^{10}, and R^{10} is H. -PO_3M_x, -(PO_3)_2M_y or -P(O)(alkyl)OM';
                      X is Cl or Br;
                      i) R<sup>1</sup> is H, R<sup>2</sup> is methyl, R<sup>3</sup> is -OH, R<sup>4</sup> is methyl, -CH<sub>2</sub>OH or
-CH<sub>2</sub>NH<sub>2</sub>, and R<sup>7</sup> is H;
                      ii) R<sup>1</sup> is -NH<sub>2</sub>, -NHMe or -N(Me)<sub>2</sub>, R<sup>2</sup> is methyl, R<sup>3</sup> is H, R<sup>4</sup> is H or -CH<sub>3</sub>,
and R<sup>7</sup> is H;
                      iii) R<sup>1</sup> is -NH<sub>2</sub> or OH, R<sup>2</sup> is methyl, R<sup>3</sup> is H, R<sup>4</sup> is H, and R<sup>7</sup> is H;
                      iv) R<sup>1</sup> and R<sup>3</sup> are H, R<sup>2</sup> is methyl, R<sup>4</sup> is -NH<sub>2</sub>, and R<sup>7</sup> is H;
                      v) R<sup>1</sup> is -NH<sub>2</sub>, R<sup>2</sup> is methyl, R<sup>3</sup> and R<sup>4</sup> are H, and R<sup>7</sup> is H,
-CH(OH)CO<sub>2</sub>H or -C(OH)(Me)CO<sub>2</sub>H;
                      vi) R<sup>1</sup>, R<sup>3</sup>, R<sup>4</sup> and R<sup>7</sup> are H and R<sup>2</sup> is methyl; and
                      vii) R<sup>1</sup> is H, R<sup>2</sup> is -NH<sub>2</sub>, R<sup>3</sup> is -OH, R<sub>4</sub> is -CH<sub>2</sub>CH<sub>2</sub>NH<sub>2</sub>, and R<sup>7</sup> is H.
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- 2. (currently amended) The compound of claim 1, wherein R^{10} is R° ,-C(O)R, $C(O)N(R)_2$, -C(O)OR, - $(CH_2)_{1-6}$ -C(O)R, or alkyl, carbocyclyl, aryl, heterocyclyl, heterocyclylalkyl, aralkyl, heterocyclylalkyl, heterocyclylalkyl, or a tumortargeting moiety; and R^{12} is -C(O)R, - $C(O)N(R)_2$, -C(O)OR, - SO_2R , or - $SO_2N(R)_2$, earbocyclyl, aryl, heterocyclyl, heterocyclyl, carbocyclylalkyl, aralkyl, heterocyclylalkyl, heterocyclylalkyl, heterocyclylalkyl, heterocyclylalkyl, heterocyclylalkyl, aralkyl or a tumor-targeting moiety.
- 3. (currently amended) The compound of claim 1, wherein R^{10} is R^{0} or and R^{12} is a polysaccharide, $-[C(O)CH(R)N(R)]_{2-3}$ -R, an antibody, or

, wherein R¹³ is H, alkyl, or aryl.

4. (cancelled).

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- 5. (currently amended) The compound of claim 4 1, wherein:
- i) R^1 is $-N(R)_2$, $-(CH_2)_{1-6}N(R^\circ)_2$, $-(CH_2)_{1-6}OR^\circ$, -NRC(O)R, $-C(O)N(R)_2$, -C(O)R, $-N(R)SO_2R$, -COOR, -SR, -C(O)R, halo, -OC(O)R, -NRC(O)OR, $-OC(O)N(R)_2$, -N(R)C(O)N(R), -NRC(S)NR, $-NRSO_2NR$, or $-C(O)NRN(R)_2$, heteroaryl, or heterocyclyl;
- ii) R^2 is H, <u>alkyl</u>, fluoroalkyl, -C(O)R, -COOR, -C(O)N(R)₂, -CN,
- -NRC(O)R, -OR, -SR, -N(R)₂, -(CH₂)₁₋₆OR°, -(CH₂)₁₋₆N(R°)₂, or halo;
- iii) R^3 is \underline{H} , alkyl, fluoroalkyl, -C(O)R, -COOR, $-C(O)N(R)_2$, -CN,
- -NRC(O)R, -SR, -N(R)₂, -(CH₂)₁₋₆OR $^{\circ}$, -(CH₂)₁₋₆N(R $^{\circ}$)₂, or halo;
- iv) R^4 is \underline{H} , fluoroalkyl, -C(O)R, -COOR, -C(O)N(R)₂, -CN, -NRC(O)R, -OR, -SR, -(CH₂)₁₋₆N(R°)₂, or halo;
- v) $R^{10} \mbox{ is H, -PO}_3M_x, \mbox{-(PO}_3)_2M_y \mbox{ or -P(O)(alkyl)OM'; or } R^{12} \mbox{ is H or } C_{1\text{-}6} \mbox{ alkyl;}$ and
 - vi) n is 1.
- 6. (cancelled).

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- 7. (currently amended) The compound of $6 \underline{1}$, wherein:
- i) R^1 is H, -N(R)₂, alkyl, -NR°C(O)NR, -NR°C(O)OR, -C(O)N(R)₂, -(CH₂)₁. ${}_6N(R^\circ)_2$, -NR°C(O)R, -CN, -COOR, -OR, -SR, or halo;
 - ii) R² is H, alkyl, fluoroalkyl, -OR°, -N(R°)₂, or halo;
- iii) R^3 and R^4 are independently H, alkyl, -OR, -N(R)₂, -(CH₂)₁₋₆OR°, or -(CH₂)₁₋₆N(R°)₂;
- iv) R^7 is H, alkyl, <u>or</u> fluoroalkyl, <u>(CH₂)₁₋₆OR, (CH₂)₁₋₆N(R)₂, -NR°C(O)R, C(O)R, C(H)(OR)R, aralkyl, heterocyclyl, heterocyclylalkyl, heteroaryl, or heteroaralkyl;</u>
- v) R^{10} is H, alkyl, -C(O)R, $-PO_3M_x$, -P(O)(alkyl)OM', $-(PO_3)_2M_y$, $-C(O)N(R)_2$, or -C(O)OR, or a tumor-targeting moiety; or and R^{12} is H, alkyl, -C(O)R, $-C(O)N(R)_2$, -C(O)OR, or $-SO_2R$, 5 membered heterocyclyl, 5-membered heteroaralkyl, or a tumor-targeting moiety; and
 - vi) n is 1.
- 8. (cancelled).
- 9. (currently amended) The compound of claim \$ 1, wherein R° is H or C_{1-6} alkyl optionally substituted with halo, hydroxy or amino.
- 10. (currently amended) The compound of claim 6-or 7, wherein R^{10} is R^{0} and or R^{12} is a polysaccharide, $-[C(O)CH(R)N(R)]_{2-3}-R$, an antibody, or

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11. (currently amended) The compound of claim 6 or 7, wherein said compound has one or more of the features selected from the group consisting of:

- i) R¹ is H, amino, -CH₂NH₂, -NHC(O)NHEt, -NHC(O)OEt, -NHCH₂OH, -NHCH₂CH₂OH, -NH-CH₂CH₂Cl, -N(CH₂OH)₂, Cl, Br, -SCH₃, CN, -C(O)NH₂, -C(O)OH, methyl, or ethyl;
 - ii) R² is H, methyl, ethyl, amino, CF₃, Cl, or Br;
 - iii) R³ is H, methyl, ethyl, amino, or hydroxy;
 - iv) R⁴ is H, methyl, ethyl, -CH₂OH, or -CH₂NH₂;
- v) each R^5 , R^6 and R^8 is independently H, methyl, ethyl, -CH₂F, -CHF₂, or -CF₃;
- vi) R⁷ is H, methyl, ethyl, or CF₃, -CH(OH)CH₃, -CH₂OH, or -CH₂CH₂OH; and
- vii) R¹⁰ is H, methyl, ethyl, -C(O)Me, -C(O)Et, -C(O)NMe₂, -C(O) p OMephenyl, -C(O)O phenyl, -P(O)(OMe)OH, -P(O)(OMe)OH, -P(O)(OMe)OH, -P(O)(OH)OP(O)(OH)OP(O)(OH)OP(O)(OH)OP(O)(OH)OP(O)OH, or R¹⁴; and R¹⁴ is selected from the group consisting of:

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antibody; or and R¹² is H, methyl, or ethyl, R¹⁴,

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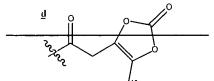
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12. (currently amended) The compound of claim 6 or 7, wherein said compound has one or more of the features selected from the group consisting of:

- i) R^1 is H, $-N(R^{\circ})_2$, $-SR^{\circ}$, or halo;
- ii) R² is H, alkyl, fluoroalkyl, -N(R°)₂, or halo;
- iii) R³ and R⁴ are independently H or alkyl;
- iv) R^7 is H or alkyl;
- v) R^8 is H or C_{1-6} unsubstituted alkyl; and
- vi) R^9 is $-OR^{10}$ and R^{10} is H, C_{1-6} unsubstituted alkyl, -C(O)R, $-PO_3M_x$, -P(O)(alkyl)OM', $-(PO_3)_2M_y$, or -C(O)OR, or a tumor-targeting moiety.
- 13. (currently amended) The compound of claim12, wherein R^{10} is a polysaccharide, $-[C(O)CH(R)N(R)]_{2,3}$ -R, an antibody, or -H, C_{1-6} unsubstituted alkyl, or -C(O)R



wherein R¹³ is H, alkyl, or aryl.

14. (currently amended) The compound of claim12, wherein said compound has one or more of the features selected from the group consisting of:

- i) R^1 is H, -NH₂, -SCH₃, or Cl;
- ii) R² is H, methyl, ethyl, -CF₃, -NH₂, or Cl;
- iii) R³, R⁴, R⁷ and R⁸ are independently H or, methyl, or ethyl; and
- iv) R^9 is $-OR^{10}$ and R^{10} is H, H, $-\frac{R^0}{2}$, PO_3H_2 , $-P(O)(OMe)_2$, -P(O)(OMe)OH, -P(O)(Me)OH, $-\frac{R^{10}}{2}$ or -P(O)(OH)OP(O)(OH)(OH), or $-\frac{R^{14}}{2}$; and $-\frac{R^{14}}{2}$ is as defined in 11.

- 15. (previously amended) The compound of claim 1, wherein said compound is IIa-1, IIa-2, IIa-3, IIa-4, IIa-5, IIa-6, IIa-7, IIa-8, IIa-9, IIa-10, IIa-11, or IIc-1.
- 16. (currently amended) A pharmaceutical composition comprising a compound of claims 1-15 and a pharmaceutically acceptable carrier.
- 17. (previously amended) The composition of claim16, further comprising at least one chemotherapeutic agent, antiangiogenic agent or agent which modulates signaling associated with hypoxic conditions in a cell.
- 18.-27. (cancelled).
- 28. (new) The compound of formula 1, wherein the compound is selected from the group consisting of:

(c)

$$\begin{array}{c} \text{NH}_2 \\ \text{N} \\$$

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29. (new) The compound of formula 1, wherein the compound is

30. (new) The compound of claim 1, wherein:

 R^1 is H or $-N(R)_2$;

R² is H or alkyl;

R³ and R⁴ are independently H or alkyl;

R⁷ is H or alkyl;

R⁸ is H or C₁₋₆ unsubstituted alkyl;

 R^9 is $-OR^{10}$ and R^{10} is H, C_{1-6} unsubstituted alkyl, or -C(O)R;

R^a, R^b, R^c, and R^d are H; and

n is 1.